

**CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
SAN FRANCISCO BAY REGION**

ORDER NO. 93-130

SITE CLEANUP REQUIREMENTS FOR:

NAVAL STATION TREASURE ISLAND
TREASURE ISLAND SKEET RANGE
CITY AND COUNTY OF SAN FRANCISCO

The California Regional Water Quality Control Board, San Francisco Bay Region (hereinafter called the Board) finds that:

1. **Site Description** - The Naval Station Treasure Island (hereinafter called the Discharger) operated a skeet range at the station. It was located on the southeast side of Treasure Island, adjacent to Clipper Cove, which is the part of San Francisco Bay between Treasure Island and Yerba Buena Island (see Figure 1). Clipper Cove is not a shallow mud flat, but is about 20 feet deep.
2. **Site History** - The range had been in operation for over 10 years, but has been closed for about 2 to 3 years. It is the intention of the Discharger to permanently close the range and eliminate any further discharge of lead or other hazardous or waste material to the Bay.
3. **Sources of Pollution** - The lead pellets from the shotguns were discharged in a southeasterly direction into Clipper Cove. The pellets can land a considerable distance, 300 to 400 feet, from the shooting positions. At this time, no estimate can be given of how much lead is in the cove. Broken clay targets also have been deposited into the cove.
4. **Environmental Concerns** - The two primary areas of concern are lead and clay target deposition. The potential effects of lead from shotgun ranges are well documented. Direct ingestion of lead pellets causes waterfowl deaths. In the San Francisco Bay area, dabbling ducks are at special risk. In both fresh and marine water, lead becomes available to biota through the transformation process of oxidation. Clay targets contain asphaltene, which in turn can contain polynuclear aromatic hydrocarbons. These types of hydrocarbons are classified as carcinogenic.
5. **Scope of this Order** - This Order contains prohibitions and tasks that require the Discharger to: 1) cease the deposition of lead shot into waters of the State or waters of the United States; 2) define the extent of lead pollution in waters of the State or waters of the United States; 3) determine the degree to which the lead is biologically available; 4) develop a remedial action plan to cleanup or manage the lead pollution; and 5) implement the remedial action plan.

6. On October 28, 1968, the State Board adopted Resolution No. 68-16, "Statement of Policy with Respect to Maintaining High Quality Waters in California." This policy calls for maintaining the existing high quality of State waters unless it is demonstrated that any change would be consistent with the maximum public benefit and not unreasonably affect beneficial uses. The discharge of waste to the surface water at this site is in violation of this policy. Therefore, the surface water quality needs to be restored to its original quality to the extent reasonable.
7. The Board adopted a revised Water Quality Control Plan for the San Francisco Bay Basin (Basin Plan) on September 16, 1992. The Basin Plan contains water quality objectives and beneficial uses for San Francisco Bay and contiguous surface waters.
8. The existing and potential beneficial uses of central San Francisco Bay and contiguous surface waters include:
 - a. Industrial service supply
 - b. Industrial process supply
 - c. Navigation
 - d. Water contact recreation
 - e. Non-contact water recreation
 - f. Ocean commercial and sport fishing
 - g. Wildlife habitat
 - h. Preservation of rare and endangered species
 - i. Fish migration
 - j. Fish spawning
 - k. Shellfish harvesting
 - l. Estuarine habitat
9. The Discharger has caused or permitted, and threatens to cause or permit, waste to be discharged or deposited where it is or probably will be discharged to waters of the State and creates a condition of pollution or nuisance.
10. This action is an Order to enforce the laws and regulations administered by the Board. This action is categorically exempt from the provisions of the CEQA pursuant to Section 15321 of the Resources Agency Guidelines.
11. The Board has notified the Discharger and interested agencies and persons of its intent under California Water Code Section 13304 to prescribe Site Cleanup Requirements for the discharge and has provided them with the opportunity for a public hearing and an opportunity to submit their written views and recommendations.

12. The Board, in a public meeting, heard and considered all comments pertaining to the discharge.

IT IS HEREBY ORDERED, pursuant to Section 13304 of the California Water Code, that the Discharger shall cleanup and abate the effects described in the above findings as follows:

A. PROHIBITIONS

1. The discharge of wastes or hazardous materials in a manner which will degrade, or threaten to degrade, water quality or adversely affect, or threaten to adversely affect, the beneficial uses of the waters of the State or waters of the United States is prohibited.
2. Specifically, the discharge or deposition of lead shot into waters of the State or waters of the United States is prohibited.

B. PROVISIONS

1. The Discharger shall perform all investigation and cleanup work in accordance with the requirements of this Order. All technical reports submitted in compliance with this Order shall be satisfactory to the Executive Officer, and, if necessary, the Discharger may be required to submit additional information.
2. To comply with all Prohibitions of this Order, the Discharger shall meet the following compliance task and time schedule:

COMPLIANCE DATE AND TASKS

- a. **COMPLIANCE DATE: May 2, 1994**

WORKPLAN FOR SEDIMENT POLLUTION

CHARACTERIZATION: Submit a technical report acceptable to the Executive Officer containing a proposal, including a time schedule, to define the horizontal and vertical extent of lead sediment pollution, including both pellet and finely divided forms.

- b. **COMPLIANCE DATE:** To be established by Executive Officer based on proposal submitted pursuant to Provision 2.a.

COMPLETION OF SEDIMENT CHARACTERIZATION:

Submit a technical report acceptable to the Executive Officer documenting completion of the necessary tasks identified in the technical report acceptable for Provision 2.a.

- c. **COMPLIANCE DATE:** May 2, 1994

WORKPLAN FOR BIOLOGICAL CHARACTERIZATION:

Submit a technical report acceptable to the Executive Officer containing a proposal, including a time schedule, to characterize the biology in the area where the lead has been deposited, and determine whether the lead has become biologically available and is affecting, or can potentially affect, plants or animals.

- d. **COMPLIANCE DATE:** To be established by Executive Officer based on proposal submitted pursuant to Provision 2.c.

COMPLETION OF BIOLOGICAL CHARACTERIZATION:

Submit a technical report acceptable to the Executive Officer documenting completion of the necessary tasks identified in the technical report acceptable for Provision 2.c.

- e. **COMPLIANCE DATE:** To be established by Executive Officer based on reports submitted pursuant to Provisions 2.b. and 2.d.

REMEDIAL ACTION PLAN: Submit a technical report acceptable to the Executive Officer containing a remedial action plan and an implementation time schedule. This report shall evaluate the removal of lead deposits in Clipper Cove and, possibly, the adjacent land areas. Removal evaluation shall consider pellet and sediment phases, and the degree of removal may be based on biological data.

- f. **COMPLIANCE DATE:** To be established by Executive Officer based on proposal submitted pursuant to Provision 2.e.

COMPLETION OF REMEDIAL ACTION: Submit a technical report acceptable to the Executive Officer documenting the completion

of the necessary tasks identified in the technical report acceptable for Provision 2.e.

3. If the Discharger is delayed, interrupted or prevented from meeting one or more of the compliance dates specified in this Order, the Discharger shall promptly notify the Executive Officer, and the Board may consider revision to this Order.
4. The Discharger shall file a report with the Board at least 30 days in advance of any changes in occupancy or ownership associated with the Site described in this Order.
5. The Board will review this Order periodically and may revise the requirements or compliance schedule when necessary.

I, Steven R. Ritchie, Executive Officer, do hereby certify that the foregoing is a full, true and correct copy of an Order adopted by the California Regional Water Quality Control Board, San Francisco Region, on October 20, 1993.



Steven R. Ritchie
Executive Officer

Attachments: Figure 1 — Site Map

